REMARKS

In view of the above amendments and the following remarks, reconsideration and further examination are respectfully requested.

I. Amendments to the Claims

Claims 1-17 have been cancelled without prejudice or disclaimer of the subject matter contained therein and replaced by new claims 18-30.

New claims 18-30 have been drafted to further distinguish the claimed invention from the prior art relied upon in the rejections discussed in detail below.

II. 35 U.S.C. § 112, Second Paragraph Rejection

Claims 16 and 17 were rejected under 35 U.S.C. § 112, second paragraph, for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. Specifically, this 35 U.S.C. § 112, second paragraph rejection states that claims 16 and 17 recite subject matter that is indefinite. This rejection is moot in view of the above-mentioned cancellation of claims 16 and 17.

Furthermore, new claim 30, which corresponds, in part, to cancelled claims 16 and 17, has been drafted to recite a non-transitory computer-readable recording medium having a program recorded thereon, such that the program causes a computer to execute a specific method. Additionally, claim 30 has been drafted to satisfy the requirements set forth by 35 U.S.C. § 112, second paragraph. As such, withdrawal of this rejection is respectfully requested.

III.   35 U.S.C. § 101 Rejection

Claims 16 and 17 were rejected under 35 U.S.C. § 101 for failure to recite statutory subject matter. Specifically, claims 16 and 17 were rejected for reciting subject matter that can be interpreted as software alone. As mentioned above, claims 16 and 17 have been cancelled and corresponding claim 30 has been drafted to recite "a non-transitory computer-readable recording medium having a program recorded thereon," which is statutory subject matter. As a result, withdrawal of this rejection is respectfully requested.

IV.   35 U.S.C. § 103(a) Rejections

Claims 1-10 were rejected under 35 U.S.C. § 103(a) as being unpatentable over the combination of Holmeide (US 2003/0142696), Henry (US 7,093,030) and Shuey (US 2004/0001008). Further, claim 11 was rejected under 35 U.S.C. § 103(a) as being unpatentable over the combination of Holmeide, Henry, Shuey, and Tanimoto (US 2003/0195947). Claim 14 was rejected under 35 U.S.C. § 103(a) as being unpatentable over the combination of Holmeide, Henry and Tanimoto. Finally, claims 15-17 were rejected under 35 U.S.C. § 103(a) as being unpatentable over the combination of Holmeide and Henry. These rejections of claims 1-17 are considered moot based on their above-mentioned cancellation. Further, these rejections are believed clearly inapplicable to new claims 18-30 for the following reasons.

New independent claim 18 recites a server including a packet transmission unit configured, upon receiving a registration request from an unregistered terminal apparatus, to transmit a measuring packet to the unregistered terminal apparatus. Further, claim 18 recites that the server includes a measured value check unit configured to receive, from the unregistered terminal apparatus, a response packet in response to the measuring packet, and configured to

12

compare a measured value (indicating a length of time from the transmission of the measuring packet to the receipt of the response packet) with a predetermined reference measurement value. Moreover, claim 18 recites that the server includes a processing status storage unit storing time segments and status notification information pieces in one-to-one correspondence, the time segments being obtained by dividing a time elapsed from the packet transmission unit receiving the registration request. Claim 18 also recites that the server includes a notification unit configured, when the measured value is larger than or equal to the predetermined reference measurement value, and when the time elapsed from the packet transmission unit receiving the registration request exceeds any of the obtained time segments, to notify the terminal apparatus of a stored status notification information piece corresponding to the obtained time segment exceeded by the time elapsed from the packet transmission unit receiving the registration request. Holmeide, Henry, Shuey and Tanimoto, or any combination thereof, fails to disclose or suggest the above-mentioned distinguishing features as recited in independent claim 18.

Rather, Holmeide, which as relied upon for teaching the features of measuring a communication time and measuring an elapsed time, as previously recited in the claims, merely teaches that a data packet including a time stamp is exchanged between a client and a server, so as to enable a calculation of (i) a round trip relay, which is a time delay caused by the exchanging of a packet, and (ii) a time offset of a client (see paragraphs [0035]-[0040]).

Furthermore, the Applicants note that Henry, which was relied upon for repeating a measurement, as previously recited in the claims, merely teaches using a network interface driver (iDriver) in a home network, such that when a mobile host is waiting for a home agent to send back a Registration-Reply packet, the iDriver repeatedly transmits a Registration-Request packet to the home agent until the iDriver receives the Registration-Reply packet from the home agent

13

within a prescribed time (e.g., 100 milliseconds) (see Fig. 6 and col. 8 and 9). Accordingly, Henry teaches that when the Registration-Replay packet is received within the prescribed time, the iDriver performs the registration processing of the mobile host.

Based on the above-mentioned disclosures, it is submitted that the combination of Holmeide and Henry appears to provide a structure where a client repeatedly transmits the Registration-Request packet to the server until the round trip delay of a packet exchanged between the client and the server becomes less than or equal to the prescribed time and, when the round trip delay becomes less than or equal to the prescribed time, the client is registered in the server.

Thus, in view of the above, even though the combination of Holmeide and Henry teaches the repeated transmission of the Registration-Request packet to the server until the round trip delay becomes less than or equal to the prescribed time, after which the client is registered, Holmeide and Henry both fail to disclose or suggest (i) storing time segments and status notification information pieces in one-to-one correspondence, the time segments being obtained by dividing a time elapsed from the packet transmission unit receiving the registration request, (ii) that when the measured value is larger than or equal to the predetermined reference measurement value and when the time elapsed from the packet transmission unit receiving the registration request exceeds any of the obtained time segments, the terminal apparatus is notified of a stored status notification information piece corresponding to the obtained time segment exceeded by the time elapsed from the packet transmission unit receiving the registration request, as recited in claim 18.

More specifically, the Applicants note that the combination of Holmeide and Henry merely teaches that the Registration-Request packet is transmitted to the server until the round

trip delay becomes less than or equal to the prescribed time, after which the client is registered, and fails to disclose or suggest that (a) time segments, which are obtained by dividing time elapsed from the reception of the registration request, and a plurality of messages each indicating a processing status of the server are stored in one to one correspondence, and (b) when the measured value is larger than or equal to the predetermined reference measurement value, and the time elapsed from the reception of the registration request exceeds any of the time segments, the terminal apparatus is notified of a message that indicates the status of the server and corresponds to the time segment that is exceeded, as required by claim 18.

Therefore, because of the above-mentioned distinctions it is believed clear that claim 18 and claims 19-30 that depend therefrom would not have been obvious or result from any combination of Holmeide, Henry, Shuey and Tanimoto.

As a result of the structure required by claim 18, the Applicants note that the server repeatedly transmits the measuring packet to the terminal apparatus and repeatedly receives the response packet from the terminal apparatus, such that when the measured value is smaller than the predetermined reference measurement value, the server registers therein the terminal apparatus.

Accordingly, based on the structure required by claim 18, a situation where a terminal apparatus is judged to be "not permitted" for registration by only a single check can be prevented. For example, suppose that a terminal apparatus is downloading a large piece of data from an external source via a home network, and another terminal apparatus transmits a registration request to a server within the home network. In this case, the measured value is likely to be larger than the reference measurement value due to the low communication speed of the home network.

15

Therefore, in such a case, the server of the present invention repeatedly transmits the measuring packet and receives the response packet. Then, when the measured value becomes smaller than the predetermined reference measurement value, the server registers the terminal apparatus in response to the registration request. However, when a long time lag occurs between the terminal apparatus transmitting the registration request and the terminal apparatus being actually registered in the server, the user of the terminal apparatus becomes concerned.

According to the above-mentioned result of the structure required by claim 10, the Applicants note that the user can understand the processing status of the server depending on the time elapsed before registration. This produces an advantageous effect of relieving the user's concern and allowing the user to handle the situation according to a message indicating the processing status of the server.

In light of the discussion above, the combination of Holmeide, Henry, Shuey and Tanimoto does not provide the above-mentioned benefits of the structure required by claim 18, because Holmeide, Henry, Shuey and Tanimoto fail to disclose or suggest (i) storing time segments and status notification information pieces in one-to-one correspondence, the time segments being obtained by dividing a time elapsed from the packet transmission unit receiving the registration request, (ii) that when the measured value is larger than or equal to the predetermined reference measurement value, and when the time elapsed from the packet transmission unit receiving the registration request exceeds any of the obtained time segments, the terminal apparatus is notified of a stored status notification information piece corresponding to the obtained time segment exceeded by the time elapsed from the packet transmission unit receiving the registration request, as recited in claim 18.

16

In other words, a result of the combination of Holmeide and Henry poses a problem, such that a long time lag occurs between the client transmitting the Registration-Request packet and the client being registered in the server, causing the user of the client to become concerned, since the user does not know the processing status of the server. In contrast, the invention according to Claim 18 includes the structures of (a) and (b) above (see page 15 above). This makes it possible to let the user know the processing status of the server depending on the elapsed time, even if a long time lag occurs between the terminal apparatus transmitting the registration request and the terminal apparatus being registered in the server. Accordingly, advantageous effects of (i) relieving the user's concern and (ii) allowing the user to handle the situation according to a message indicating the processing status of the server, are produced.

Furthermore, there is no disclosure or suggestion in Holmeide, Henry, Shuey and/or Tanimoto or elsewhere in the prior art of record which would have caused a person of ordinary skill in the art to modify Holmeide, Henry, Shuey and/or Tanimoto to obtain the invention of independent claim 18. Accordingly, it is respectfully submitted that independent claim 18 and claims 19-30 that depend therefrom are clearly allowable over the prior art of record.

V.   Conclusion

In view of the above amendments and remarks, it is submitted that the present application is now in condition for allowance and an early notification thereof is earnestly requested. The Examiner is invited to contact the undersigned by telephone to resolve any remaining issues.

Respectfully submitted,

Natsume MATSUZAKI et al.

/Andrew L. Dunlap/
2011.11.03 13:49:32 -04'00'
By _____

Andrew L. Dunlap
Registration No. 60,554
Attorney for Applicants

ALD/cso
Washington, D.C. 20005-1503
Telephone (202) 721-8200
Facsimile (202) 721-8250
November 3, 2011

18